

REMARKS

The paper copy of the Sequence Listing for the subject application, is by this amendment, added after the last page of the application to replace the Sequence Listing previously filed on May 8, 2001.

Favorable consideration on the merits is respectfully requested.

Respectfully submitted,

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Date: September 4, 2001

Attachment to Preliminary Amendment dated May 8, 2001

Marked-up Copy

Page 1, Paragraph Beginning at Line 2

This application is a divisional of U.S. Application No. 09/095,106, filed on June 10, 1998 which is a continuation of International Application No. PCT/SE96/01621, filed December 9, 1996, which International Application was published by the International Bureau in English on June 19, 1997, that designates the United States and which claims priority from Swedish Application No. 9504467-3, filed December 12, 1995, and U.S. Provisional Application No. 60/009,386, filed December 29, 1995, which are herein incorporated by reference.

Page 3, Paragraph Beginning at Line 32

According to the invention, it has now been found that the Lys-Leu-Val-Phe-Phe (KLVFF) sequence [SEQ ID NO.: 1] in A β is necessary for polymerization to occur. Peptides incorporating this sequence bind to A β and are capable of blocking the fibril formation of A β -1-40 and are therefore potentially useful as drugs.

Page 9, Paragraph Beginning at Line 18

Fig. 2B. [SEQ ID NOS.: 1, 2 and 5-38] EVHHQKLVFF and N and C-terminal truncated fragments were synthesized and analyzed for affinity to [¹²⁵I-labelled] ¹²⁵I-labeled A β -1-40.

Page 9, Paragraph Beginning at Line 21

Fig. 2C. [SEQ ID NOS.: 39-43] Each amino acid residue in KLVFF was systematically replaced with Ala and analyzed for affinity to [¹²⁵I-labelled] ¹²⁵I-labeled A β -1-40.

Page 9, Paragraph Beginning at Line 24

Fig. 2D. [SEQ ID NO.: 44] Sensorgram from surface plasmon resonance spectroscopy (BIAcore 2000).

Page 12, Paragraph Beginning at Line 5

To investigate if the KLXXF [SEQ ID NO.: 3] motif was required for A β polymerization, we synthesized A β -1-28, a well-studied A β fragment that readily forms amyloid fibrils (D.A. Kirschner, *et al.*, *Proc. Natl. Acad. Sci. USA* 84, 6953-6957 (1987); C.J. Barrow, M.G. Zagorski, *Science* 253, 179-82 (1997); C. Nordstedt, *et al.*, *J. Biol. Chem.* 269, 30773-30776 (1994))) and mutated A β -1-28 where the KLVFF sequence was substituted with AAVFA [SEQ ID NO. 4] (A β -1-28^{AAVFA}).

0950064-0503304
T02050-T02050